US ERA ARCHIVE DOCUMENT

Inland In-Situ Burning of Oil Spills: Regulations and Authorizations

Leigh DeHaven
U.S. Environmental Protection Agency
Office of Emergency Management
Regulation and Policy Development Division

Overview

- Review of regulations, policy, guidelines, and tools that impact in-situ burning decisions
 - Federal
 - Regional [Regional Response Team (RRT)]
 - State

In-Situ Burning of an oil spill should be authorized by an On-Scene Coordinator from the appropriate State or Federal Agency (USCG or EPA)

Oil Spill 101 – A Quick Review

- Oil Spill Notification Who do you call to report a Spill?
 - National Response Center (NRC)-managed by USCG 800-424-8802

The Clean Water Act and Oil Pollution Act of 1990 prohibit the discharge of oil to navigable waters and adjacent areas (40 CFR 110.6)

- Executive Order 12777 of 1991 (Per GHWB)
 - Outlines NCP, NRTand RRT Roles and responsibilities for Oil Spills

Inland Oil ISB Federal Regulations

- National Oil and Hazardous Substances Pollution Contingency Plan (NCP) – 40 CFR part 300
- Federal Government's blueprint for oil spill planning and response
 - Provides organizational structure and procedures for responding to discharges of oil
 - Original NCP Executive Order signed by LBJ 41 years ago
 - Lists expectations and objectives of the Regional Response Teams (RRTs) [Part 300.114]
 - Establishes area committees and area contingency plans
 - Subpart J addresses the usage appropriate burning agents (Part 300.910)

Burning Agent Use

- Burning agents: Additives that through physical or chemical means, improve the combustibility of the materials to which they are applied
- As potential pollutants, Burning agents are regulated under
 - NCP Subpart J Section 300.910
 - Section 311 of the Clean Water Act (CWA) as amended by the Oil Pollution Act (OPA) of 1990
 - Sections 109 and 110 of the Clean Air Act (CAA)

Burning Agent use is authorized on a case by case basis by concurrence of the OSC, RRT and Natural Resource Trustees

Applicable Federal Regulations (continued)

- Sections 109 and 110 of the Clean Air Act (CAA)
 - Implemented mainly by states and localities through State Implementation Plans (SIPs) for protection of air quality
 - PM-10= measurement of Particulate Matter: In 1987, EPA replaced the earlier Total Suspended Particulate (TSP) air quality standard with a PM-10 standard.

Memorandums of Agreement

Increase cooperation and understanding among agencies during an oil spill response

Example:

- Inter-Agency Memorandum of Agreement (MOA) Regarding Oil Spill Planning and Response Activities under the Federal Water Pollution Control Act's National Oil and Hazardous Substances Pollution Contingency Plan and Endangered Species Act (2002)
- This MOA involves cooperative involvement from EPA, U.S. Coast Guard, Department of the Interior, and Department of Commerce
- At a Dec. 2008 ISB workshop sponsored by API, the development of a national MOU for ISB between the EPA and Forest Service/NIFC was discussed. This could assist in the expedited sharing of knowledge and resources between the prescribed fire community and EPA OSCs during an inland in situ burning of oil response.
- Ann Whelan and OSC Michelle Jaster of EPA R5 are currently developing an MOU with Isle Royal National Park (NPS) and the Fish and Wildlife Service which may eventually act as a template for a National MOU.

Some Inland ISB TOOLS

- Selection Guide for Oil Spill Applied Technologies NRT
 - Guidance for when to use ISB on land, authority required, health and safety issues, and general application requirements. This is currently being updated to include inland ISB
- SMART: Special Monitoring of Applied Response Technologies – U.S. Coast Guard, National Oceanic and Atmospheric Administration, Centers for Disease Control and Prevention, Minerals Management Service, and EPA
 - Guidance for monitoring in-situ burning operations Real time monitoring to determine Human Health exposures during a burn

Regional Response Regions of the US



Applicable Regional Regulations and Policies for ISB Response

RRT ISB Policies vary throughout the Regions...and many of these policies were originally designed for open water burning...

- Region 1: *Memorandum of Understanding* (1999)
 - Incorporated into the Regional Contingency Plan (RCP)
- Region 2: Memorandum of Understanding (June 1996)
 - Contains a decision making checklist for use of ISB as a response tool for oil spills
 - Includes an important regional protocol and decision diagram
- Region 3: RRT III Guidance Document (March 2003)
 - Contains a Decision Tree and Checklist for executing an ISB

- Region 4: Regional Response Team Policy for Use of In-Situ Burning in Ocean, Coastal, and Inland Waters (2001) Incorporated into the Regional Contingency Plan (RCP)
 - Outlines various protocols that FOSCs may follow in order to receive clearance for using in-situ burning in inland areas
- Region 5: *Oil and Hazardous Materials Contingency Plan* (2008)
 - Suggests in-situ burning be used to remediate the negative impacts on the environment and natural resources from the oil spill
 - States that in-situ burning should not replace, but accompany mechanical and chemical response methods

- Region 6: Guidelines for Inshore/Nearshore In-Situ Burn (January 1996)
 - Contains a checklist and guidance for conducting Inshore/Nearshore in-situ burning
- Region 6: In-Situ Burn Plan (March 1994 currently updating)
 - Includes a detailed operational plan in regards to using in-situ burning as an effective response to inland oil spills
 - Presents various situations with appropriate response protocol, as well as checklists for necessary response equipment and use of SMART Protocol

- Region 7: Integrated Contingency Plan (2008)
 - Integrates the various requirements under regional and area contingency plans
 - Involves appropriate federal response, specifically for the EPA, under the Stafford Act or FEMA's National Response Framework
- Region 7: Policy and Guidelines on the Use of In-Situ Burning and Chemical Oil Spill Treating Agents for Region 7 (2001)
 - Allows for appropriate decision making by OSCs when using in-situ burning as a response tool for oil spills
 - Updated RRT VII ISB Checklist (July 2003)

- Region 8: ISB Checklist (December 1999)
 - Identifies necessary guidelines to follow for the implementation of insitu burning
- Region 9: *Region Contingency Plan Appendixes* (May 2006)
 - See Letter of Agreement (LoA) in the Region's Regional Contingency Plan
 - Includes a checklist & decision tree to follow before using in-situ burning
- Region 10: Policy in Northwest Area Contingency Plan (NWACP) (July 2006)
 - Includes a detailed checklist, including appropriate remediation methods for burn residue
 - SMART protocols are used in Regional training purposes.

Other Inland ISB Policies Referenced by Regions

- Alaska RRT Guidelines (updated in 2008)
 - Includes an operational checklist, pre-approval zones, expedited and decision process
- Hawaii Letter of Agreement (LoA) (June 1994)
 - No LoA/Preapproval for outer islands including Guam, Commonwealth of the Northern Mariana Islands (CNMI), and American Samoa
- Caribbean RRT Burning Plan/Policy (May 1996)
 - Policy for Puerto Rico and U.S. Virgin Islands
 - References SMART training program

A Few Examples of State Regulations and Policy

- Alaska Regional Response Team "In Situ Burning Guidelines for Alaska," Appendix II, Annex F, in the Alaska Federal/State Preparedness Plan for Response to Oil and Hazardous Substance Discharges/Release (2007)
- California Code of Regulations Title 14, Division 1 Subdivision 4, Office of Oil Spill Prevention and Response, Chapter 3 Oil Spill Prevention and Response Planning, Subchapter 3 Oil Spill Contingency Plans Section 820.01 (2007)
- North Dakota Application for Approval to Burn Liquid Hydrocarbons (Region 8)
 - Ensures the safety of residents residing in the vicinity of the spill, and emphasizes the importance of compliance with relevant state regulations and policies when conducting a burn

Take Home Message>>>>

It is important to acquire and understand the regulations, policy and authorizations where you are conducting In-situ Burn of Oil Spills (federal, state and regional)

 REMEMBER: Each Regional Response Area has different protocols and requirements!!!!!

Questions??? Comments???

Thank you!!!!!!!

Contact Information:

Leigh DeHaven

U.S. Environmental Protection Agency
Office of Emergency Management (OEM)
Regulation and Policy Development Division
1200 Pennsylvania Ave., NW (5104A)
Washington, DC 20460
(202) 564-1974

<u>Dehaven.leigh@epa.gov</u>